



UNIVERSITA' DEGLI STUDI DI TRENTO - DIPARTIMENTO DI ECONOMIA

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**Worker involvement in entrepreneurial  
nonprofit organizations.  
Toward a new assessment of workers'  
perceived satisfaction and fairness.**

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and  
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### **Abstract**

Exploiting a unique data set created in 1998 on a sample of 228 public, nonprofit and for-profit organizations working in the social service sector, and on 2066 workers, the paper seeks to demonstrate that workers' satisfaction and loyalty to the organization is influenced by the incentive mixes offered by different organizational forms. Nonprofit organizations are found to give more weight to intrinsic and relational aspects of the work than to monetary aspects. They tend to pay lower wages and to produce a mix of incentives based on non-monetary rewards compared to public bodies and for-profit enterprises. The role of distributive and procedural fairness will be investigated as well. Fairness emerges as a crucial factor which influences both satisfaction and loyalty. Besides this general result, procedural justice is found to be the most important determinant of workers' general satisfaction with their jobs.

## 1. Introduction

Social enterprises, especially those engaged in the continuous delivery of social services, comprise various type of non-profit organization, of which especially widespread in Italy are social cooperatives. Among nonprofit organizations (NPOs hereafter), which include religious and non-religious nonprofits, some of which take the form of foundations, associations, or moral bodies, social cooperatives grew to a remarkable extent during the 1990s. In that period, an increasing number of social enterprises assumed the form of quasi-workers' cooperatives with a non-profit distribution constraint (although this is not necessarily absolute).<sup>1</sup>

In more general terms, the evolution of entrepreneurial nonprofit cannot be explained solely on the basis of non-profit theories which concentrate on the existence of information asymmetries between producers and consumers.<sup>2</sup> This is for two reasons. First because the services supplied are often private or collective goods, but with repeated consumption and therefore with limited information asymmetry problems. Second because in the case of enterprises wholly or largely owned by the workers, any profit distribution constraint loses much of its significance, given the ability of these enterprises to evade it by increasing the remuneration of their workers. Indeed, if they take on self-interested, rational and optimizing workers, one would expect these forms of enterprise to be more likely to exploit information asymmetries or incomplete contracts with consumers in favor of their workers. This behavior can be mitigated only by the presence of voluntary workers or users with strong decision-making powers. However, empirical analysis shows that these are often not present in these organizations, and that when they are, often they do not occupy important positions in the governance structure. Furthermore, both workers and managers in non-profit organizations (traditional as well as those owned by workers and/or volunteers) are invariably paid less than are the workers and managers in public organizations delivering the same or similar services, and that they are not normally paid more than those working in for-profit enterprises. Moreover, social enterprises do not seem to grant their workers more fringe benefits than do the other types of organization.<sup>3</sup>

An alternative theory is that the existence of social enterprises entails that efficiency is tied to the sharing and fulfillment of 'social missions', and it may be greatly reduced by opportunistic behavior (Besley and Ghatak, 2003; Grimalda and Sacconi, 2003). This idea reflects some of the most recent literature on NPOs and social enterprises (Sacconi, 2000; Borzaga and Defourny, 2001; Anheier and Ben-Ner, 2003). This kind of explanation works well only if workers join the organization in a voluntary way and are not tied to it for exclusively economic reasons. When workers choose the organization because of lack of alternatives, economic motivations are paramount and the mission may be shared only formally.

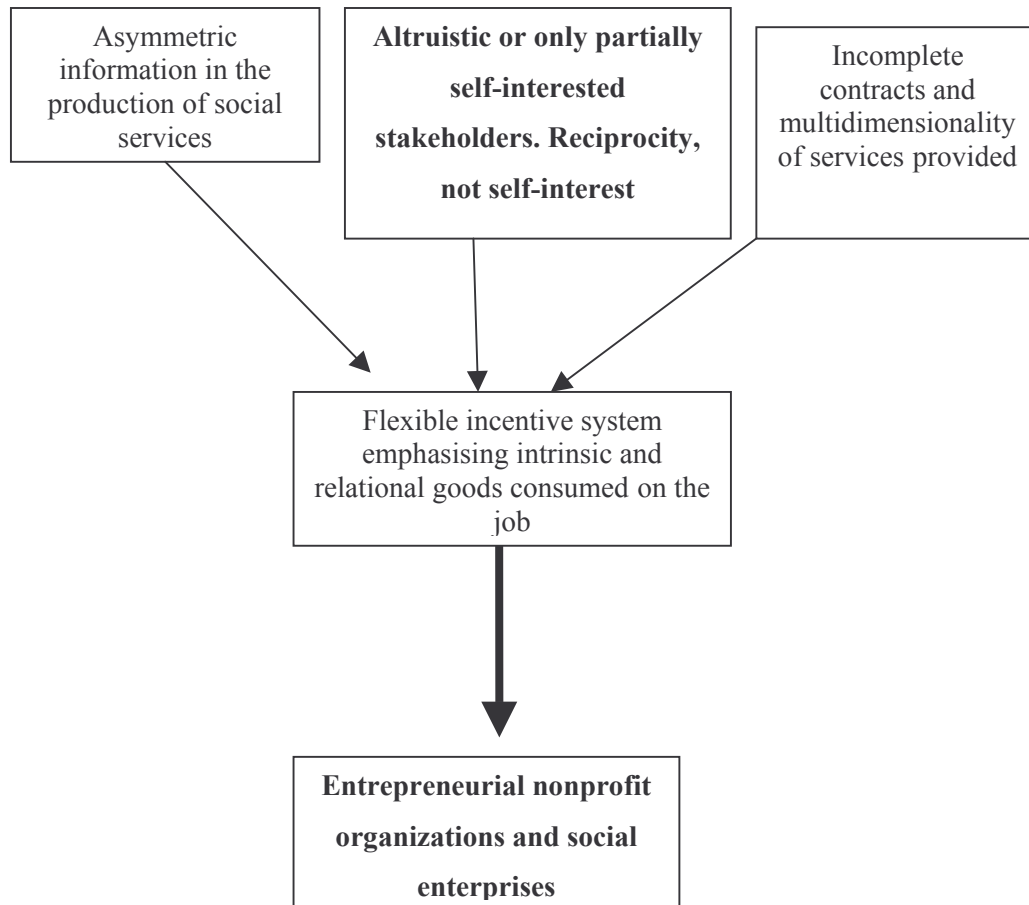
We may now take some further steps forward by enriching the base hypotheses in two ways:

a. the first: by hypothesizing individuals (workers) who are not completely self-interested and above all not necessary opportunistic ('ideological workers', to paraphrase Rose-Ackerman, 1987, 1996; but see also Turati, 2001, on the role of altruism and interpersonal relations) with more complex utility functions, i.e. not restricted to the free time/wage trade-off, and also interested in non-monetary benefits that are the result of collective more than individual choices. In addition to this is study of the role of fairness and reciprocity in behaviors not relatable to pure self-interest (Fehr and Gächter, 2000, 2002; Fehr and Schmidt, 2001);

b. second: by considering the enterprise as a flexible incentives structure able to utilize not only monetary and economic incentives but also to satisfy other needs (moral, ideological, cultural, relational, etc.) of the stakeholders – the workers in particular – and to make these structures functional to the particular circumstances in which they operate, selecting stakeholders and developing their various propensities (Bacchiaga and Borzaga, 2001, 2003; Borzaga and Depedri, 2004).

Figure 1 shows the new hypothesis in the form of a flow chart. Added to the traditional arguments linked to the presence of asymmetric information in the production of public utility services, and of incomplete contracts and multidimensionality of services provided, is a third element which completes the picture. Altruistic or only partially self-interested workers will participate in the production of social services without requiring competitive wages if a proper incentive system emphasizing intrinsic and relational goods is established.

Figure 1 - The origin of social enterprises



By introducing these two hypotheses it is possible to propose an interpretation of non-profit organizations and in particular of worker- (and volunteer-) owned social enterprises able to explain the recent evolution of the third sector in Italy and Europe. On this interpretation, these organizations are complex and distinctive structures of extrinsic and intrinsic incentives which serve to attract workers who are not exclusively attracted by monetary remuneration. The extrinsic incentives certainly include remuneration, although this is not necessarily the most important of them. Moreover, one should also consider relative pay-levels, expectations and the workers' perception of the fairness of the wages structure.

The intrinsic incentives comprise the perceived degree of fulfillment of the firm's social mission, the transparency of the organizational structure, opportunities for workers to accomplish moral or ideological aspirations, and finally the consumption of relational goods (or positive relations) on the job. The ensuing mix of incentives curbs possible opportunistic behavior by establishing implicit contracts based on enterprise culture (Fehr and Schmidt, 1999; 2001).

The importance of these various aspects has been emphasized by several authors, and their presence has been tested by empirical research on workers in non-profit organizations. Some authors have stressed the importance of workers' attitudes and motivations (Mirvis, 1992), others have investigated the presence and importance of non-monetary rewards (Almond and Kendall, 2000), both extrinsic like greater opportunities for training and greater worker flexibility (Almond and Kendall, 2000) and intrinsic like involvement in the organization's activity and management, the sociality of work, etc. Moreover, several authors have analyzed the perception of greater fairness in wage structures and, more generally, in the incentives structures of NPOs (Levine, 1991; Leete, 2000).

Research has generally confirmed that worker satisfaction with these incentives structures is high (and mostly higher than in other organizations) even in the presence of wage levels lower than in competing enterprises (Mirvis, 1992; Borzaga and Musella, 2003; Borzaga and Depedri, 2004). Moreover, workers seem more willing to 'donate work' and more loyal to the organization than are workers in other organizations (Almond and Kendall, 2000, Borzaga and Depedri, 2004).<sup>4</sup>

None of the authors mentioned, however, has sought to identify all the elements in the incentives structures adopted by non-profits and in particular by worker- and/or volunteer-owned non-profits. In the majority of cases, they do no more than emphasize only one or a few of them.

We intend to remedy this shortcoming by drawing from the theoretical and empirical literature the largest possible number of components of these incentives structures, seeking to specify how non-profit organizations in general and worker-owned ones in particular make use of them. In describing these various components, besides the



literature, we shall draw on data collected by a survey conducted in Italy in 1998 on the social services sector.<sup>5</sup>

The aim is to initiate a new theoretical approach characterizing different organizational forms on the basis of the incentive mixes they devise in order to motivate workers. To this end, an innovative approach is used which considers workers' perceived satisfaction and justice, and exploits a unique data set. Incentive mixes are described not only in terms of the absolute amount of monetary rewards but also in those of the perceived fairness of procedures and relative remuneration. We find a significant difference in incentive mixes across organizational forms (worker owned nonprofits, other nonprofits, for-profit firms, and public organizations) but much stronger differences in perceived justice, which appears to be most important determinant of workers' satisfaction.

The paper is organized as follows: Section 2 gives a more detailed description of the elements of incentive mixes which will be considered; Section 3 introduces the empirical part of the paper, describing the data and sampling procedures and highlighting the general features of the organizations concerned; Section 4 examines the main features of workers' attitudes to work and of their choice of the organization. Section 5 comprises the bulk of the work. Ordered probit and logit estimations will be conducted to identify the elements influencing workers' satisfaction and loyalty to the organization. Moreover, extrinsic, intrinsic, and relational incentives will be described in more depth. Principal components analysis will be performed on the items of satisfaction in order to single out second level or hidden dimensions characterizing incentive mixes. Section 6 addresses the issue of distributive and procedural fairness in influencing workers' satisfaction and loyalty to the organization. The role and weight of fairness is assessed by means of new probit and logit estimates. Section 7 concludes the paper.

## 2. An overview of the components of the incentive structures for workers

A cross-wise reading of theoretical and empirical studies yields the main components of the incentives structures designed to induce workers to share the enterprise culture and to reduce opportunistic behavior. These components can be grouped under three headings:

- a. extrinsic incentives consisting of economic benefits paid in exchange for work performance. They divide into two categories: monetary incentives (the wage) and non-monetary ones (professional growth, job security, working hours compatible with workers' needs; career advancement; the working environment),
- b. intrinsic incentives consisting in the contents and features of the work which coincide with the workers' intrinsic motivations and permit their maximum

expression (for example, the creativity of the work, fulfillment of the workers' aspirations, opportunities to take active part in the organization's activities through various forms of participation, and the democratic features of the governance structure);

c. relational incentives consisting of opportunities for workers to engage in meaningful relations with each other, with the managers, and with the users: these may be considered to be a part of the workers' remuneration which is consumed directly on the job and therefore reduces disutility (Borzaga and Depedri, 2004).

According to the recent literature on fairness and reciprocity (Fehr and Gächter, 2000, 2002; Fehr and Schmidt, 2001), for each type of incentive it is important to evaluate not only absolute levels and their relations with worker well-being (approximated in our case by the level of satisfaction) – relations which are not always linear – but also (and especially) the relative levels and perception of fairness in the distribution of incentives held by workers. The literature introduces the concept of distributive fairness to analyze workers' perception of fairness in their economic treatment, this being evaluated in respect of both the organization's characteristics and the personal and occupational ones of the workers themselves. On the other hand, procedural fairness (Benz and Stutzer, 2002; Benz, Frey and Stutzer, 2002; Frey and Stutzer, 2004) will be examined on the basis of transparency in career processes and in decision-making, in internal communication and the balance between what the worker supplies to the organization and what the latter provides as remuneration (not only economic) for the worker.

Having thus defined the incentives structure, we may now verify the extent to which individual types of incentive are used, conducting specific analysis of worker-owned non-profit organizations (social cooperatives) and other nonprofits, and comparing it with analysis of the other organizational types. A stringent methodological question in this context is how worker utility is to be measured at the empirical level. The traditional economic view requires utility to be inferred from observed behavior, not measured directly. Here, a different approach will be adopted which uses self-reported satisfaction scores and intentions to stay with the organization as success indicators. This may not be the standard methodology in economics, but satisfaction measures are increasingly accepted as suitable proxies for utility (Oswald, 1997; Frey and Stutzer, 2002; Benz and Stutzer, 2002; Frey and Stutzer, 2004).

Two indexes of procedural and distributive fairness will be added to the traditional variables already present in the literature mentioned. This will be done in order to determine whether they help explain workers' satisfaction and loyalty. It will be of particular importance to check whether fairness adds to the other variables associated with satisfaction, or whether it replaces them. If fairness replaces the other variables, it can be equated to and compared with them as if it were a 'second level' incentive mix.

If it does not, then it ought to be better interpreted as an independent criterion used by workers to assess the organization's ability to satisfy them and to make them more loyal. In this latter case, fairness would pertain to the realm of satisfaction with processes more than to the realm of satisfaction with outcomes, since satisfaction with outcomes is already included among the initial regressors. These hypotheses will be tested in section 6 by means of ordered probit analysis.

### 3. The research: structure and main results

The research whose results are discussed in this paper was conducted in 1998 on a homogeneous sector in Italy: that of social-welfare and educational services. It involved 228 organizations (for a total of 268 operational units) operating in 15 Italian provinces and with different organizational forms. Beside public bodies and for-profit firms, nonprofit organizations were sorted into three different groups: social cooperatives, non-religious and religious non-profit organizations.

Separate questionnaires were administered to the organization (and its operational units), the paid workers, the managers, and voluntary workers to collect information on a total of 2066 paid workers, 266 managers, and 724 volunteers. The questions enabled important and detailed information to be gathered on both the general characteristics of the organization and the occupational, socio-demographic features of workers and their well-being. Table 1 shows the main characteristics of the workers involved in the study: the strong predominance of female workers is immediately apparent and evidences a kind of protection granted by the social service sector to the weaker and less employable social groups. Workers are quite young, being usually 30 to 39 years old. The predominant educational qualification is a high-school diploma, and part-time employment contracts are much more common than full-time ones. This result is at odd with the general Italian situation, where long-term contracts are the rule.

Table 1. Workers' characteristics by organizational form

	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non-religious n- p</u>	<u>Religious non-profit</u>	<u>Percent</u>
<u>Gender</u>						
Male	15.4	12.7	29.3	31.1	20.2	22.9
Female	84.6	87.3	70,7	68,9	79,8	77,1
<u>Age</u>						
<u>Less than 25 years old</u>	5.2	9.0	8.8	2.1	7.0	6.1
25 to 30	11.5	17.5	27.5	17,4	15,5	18,3
30 to 39	37.4	45.5	39	41.3	39,4	39.7
40 to 49	35.2	15.3	17.3	26.9	24.9	25.3
More than 50 years old	10.7	12.7	7.4	12.3	13.1	10.36
<u>Educational attainment</u>						
Elementary school	4.6	10.8	4.8	4.3	7.3	5.5
Lower intermediate diploma	18.7	26.6	21	15.7	36.2	21.3
Technical education	30.9	18.7	14	10.7	16.1	19
High-school diploma	33.2	30.5	42.9	44.4	28.9	37.7
University degree or higher	12.5	13.3	17.4	24.8	11.5	16.5
<u>Contractual relation</u>						
Part-time	86.6	84.8	70.5	76.4	82.3	79.1
Full-time	13.4	15.2	29.5	23.6	17.7	20.9

The data enabled analysis to be made of the mix of incentives in terms of the workers' expectations (i.e. their motivations). This analysis was made possible by examination of two behavioral features of workers: satisfaction and loyalty to the organization. The former enables investigation of the subjective level of utility obtained from the job as regards both material aspects and, especially, intrinsic and relational ones. The latter enables investigation of the relation among motivation, satisfaction and desire to stay with the organization, and it is an indicator of the capacity of the incentives mix to involve workers and to satisfy their needs, increasing their commitment to the enterprise's mission and their sense of belonging to the group.

In regard to these two aspects, the sector's distinctive features and the differences among organizational types should be borne in mind. As far as the general features of satisfaction are concerned (Table 2), workers in the sector as a whole are sufficiently satisfied with their jobs. The workers with the highest level of satisfaction are those in the religious nonprofits, followed by the employees of social cooperatives, for-profits and the other non-religious nonprofits. Public-sector employees are the least satisfied with their work in general.

Table 2. Workers' satisfaction\*

	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non- religious n-p</u>	<u>Religious non- profit</u>	<u>Total</u>
<u>The job as a whole</u>	4.99	5.39	5.39	5.25	5.53	5.26

(\*) The interviewees chose a value from a scale from 1 (minimum) to 7 (maximum).

As regards loyalty, the differences among organizational types should be principally borne in mind (Table 3). It emerges that the majority of workers in nonprofits, especially if religious or other non-religious nonprofits, strongly desire to stay with the organization as long as possible. The percentage is slightly lower in for-profit enterprises and social cooperatives, but it is in public organizations that the percentage of workers wanting to remain as long as possible is much the lowest, though, even when they want to change their sector of activity, they prefer to stay employed in the public sector. In the case of social cooperatives this negative result is partly off-set by a high percentage of workers wanting to remain with their organizations for at least some

years, while in that of the for-profit and the public organizations this off-setting factor is not present. Consequently, for-profit enterprises and public agencies have not negligible percentages of workers intending to leave the organization but wanting to stay in the same sector.

Table 3. Loyalty to the organization by nature of the organization (percent)

	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non-religious n- p</u>	<u>Religious non-profit</u>	<u>Total</u>
<u>Intend to stay as long as possible</u>	.37	.49	.47	.51	.63	.47
<u>Intend to stay at least for some years</u>	.13	.11	.18	.12	.08	.13
<u>Quit the organization if a better job opportunity in the same sector is found</u>	.22	.17	.15	.14	.12	.17
<u>Quit the organization if a better job opportunity also in a different in sector is found</u>	.17	.20	.14	.22	.14	.17
<u>Leave the organization as soon as possible</u>	.03	.01	.01	.00	.01	.01

Finally to be considered is pay. A result already obtained by empirical research is specification of the different wage structures that characterize nonprofits. All studies have shown that pay is lower in nonprofits than in public organizations producing the same services (Levine, 1991; Leete, 2000). This is not so compared to for-profit enterprises, however, especially when similar activities are considered. Indeed, it has been reported (Almond and Kendall, 2000) that in particular situations (wages much below the national average), nonprofits seem to ‘protect’ their workers by paying them higher wages than do for-profit organizations.

Our research confirms these findings (Table 4). Wages are much lower in private organizations than in public ones. The minimum levels are reached in social cooperatives and religious nonprofits, followed by for-profit enterprises. The wages paid by the latter, however, are on average lower than those paid by non-religious nonprofits, so that one may conclude that, as shown by previous studies, in certain cases

nonprofits can protect their workers better than for-profits also at the level of monetary remuneration.<sup>6</sup>

Table 4. Workers' pay in the social services sector by type of organization (average values in Euros)

	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non-religious n-p</u>	<u>Religious non-profit</u>
<u>Monthly pay</u>					
Full-time	901.40	798.84	768.24	856.76	758.69
Part-time	549.12	608.35	502.33	627.34	543.91
<u>Hourly pay</u>					
Full-time	6.29	5.37	5.14	5.96	5.28
Part-time	6.75	9.07	6.22	7.38	5.65

The implications of wage differences among types of organizations in the same sector, and the possibility of off-setting monetary shortfalls with various kinds of incentive (mainly intrinsic and relational but also non-monetary extrinsic), will be examined in the next sections.

#### 4. Motivations

Few authors have examined the motivations that induce workers to choose one particular job rather than any other (Pagano, 1985; Frey, 1997). Separate analysis of attitudes towards work and the reasons for choosing a specific organization sheds useful light on the motives that induce workers to prefer a particular sector and a particular organization. As regards the former, the survey (Table 4) shows that workers in the social services sector see their work principally as a means to earn a living, i.e. as a necessity and as a way to help their families. Nevertheless, they also give great importance to the socio-relational aspects of their work: indeed, they believe it to be an opportunity for self-fulfillment and for relating with others. Above all, however,

attitudes by workers in the sector are very homogeneous, regardless of whether they are employed by public agencies, for-profit enterprises or nonprofit organizations. This is indicative of a shared position vis-à-vis the sector as a whole, i.e. of a general interest among workers in the activities of the social services sector. In fact, the motivational item given the highest score (and therefore the greatest importance), both on average for the sample and for each type of organization,<sup>7</sup> was interest in the sector.

More interesting, however, is analysis of the reasons why workers decide to work for a particular type of organization. In general, workers choose their organization mainly because they are attracted by the sector in which it operates. But a certain influence is also exerted by approval of the way in which the organization works with users, the coherence of the job with training, and its compatibility with other commitments. Features that are instead of minor importance in determining the choice of an organization are the pay and the career prospects that it offers.

Of considerable importance are the marked differences among the workers in the various types of organization, and very different motivations are apparent, firstly among public, for-profit and non-profit organizations, and secondly among nonprofits themselves. As regards the former features, the employees of public organizations are (slightly) less attracted by the way in which those organizations work with users, while workers in for-profit enterprises give greater importance to extrinsic motivations (especially job security). As regards the latter aspect, i.e. the difference among types of nonprofits, it is workers at social cooperatives that display the most distinctive features (Table 5) in that they give most importance to involvement in the organization and in management decisions, but also to interest in the sector and the way in which the organization works with users. The specific strength of social cooperatives is therefore their ability to attract personnel interested not only in working in the social services sector but also in being involved in the organization,<sup>8</sup> and in the possibility of influencing its decisions and policies.

Despite these differences, all workers in the sector seemingly give little importance to pay and career, or to the fact that their job was the only one available. They regard its match with education and its compatibility with other commitments as much more important.



Tab.5. Attitudes towards the work and the organization\*

	Public ownership	For-profit	Social cooperatives	Other non- religious n-p	Religious non- profit	Total
<u>Attitudes towards work</u>						
<u>Intrinsic aspects</u>						
An opportunity for self-fulfillment	5.5	5.8	5.5	5.6	5.7	5.6
A contribution to society	4.3	4.2	4.2	4.4	4.6	4.3
<u>Extrinsic aspects</u>						
A necessity	5.6	5.7	5.6	5.6	5.7	5.6
A hobby	2.1	2.2	2.1	1.9	2.5	2.1
A way to gain recognition	2.5	3.0	2.8	2.6	2.5	2.6
<u>Economic aspects</u>						
To earn a living	5.7	5.9	5.6	5.6	5.8	5.7
To earn as much as possible	2.8	3.4	2.9	2.8	3.3	2.9
To support the family	5.5	5.7	5.1	5.3	5.5	5.4
<u>Relational aspects</u>						
An opportunity to form new relationships	4.9	5.0	4.8	4.6	4.9	4.8
<u>Choice of organization</u>						
<u>Intrinsic</u>						
Interest in the sector	5.3	4.9	5.5	5.6	5.2	5.4
way in which it works with users	3.8	4.0	4.6	4.7	5.0	4.4
Workforce involvement	3.1	3.5	3.9	3.4	3.9	3.5
<u>Extrinsic</u>						
Match with training	4.6	4.2	4.3	4.9	4.4	4.5
Compatibility with other commitments	4.5	4.6	4.5	4.4	5.0	4.5
Job security	4.5	5.2	3.4	3.7	4.9	4.1
<u>Economic</u>						
Pay and career	2.1	2.4	2.3	2.3	2.7	2.3
<u>Relational</u>						
Getting to know other workers	2.8	2.6	3.4	3.7	3.7	3.2
Getting to know users	2.0	1.7	2.3	2.5	2.8	2.3
<u>Only job available</u>	3.6	4.0	3.4	3.3	4.2	3.6

(\*) The interviewees chose a value from a scale from 1 (minimum) to 7 (maximum).

## 5. The mix of incentives

Remunerating workers means, especially in a sector where social and relational commitment are highly significant, creating mixes of incentives which ensure workers' satisfaction and socio-relational as well as economic well-being, and matching the motivations which induced them to work in that particular sector with that particular organization. Consequently, the elements to be considered when discussing incentive structures and forms of worker remuneration are numerous and not always directly measurable.

From this point of view, the correlation among workers' motivations, the mix of incentives offered by the organization, and satisfaction and loyalty to the organization can be tested by means of two models: one centred on satisfaction, which considers the influence of motivational aspects; the other intended to investigate the influence of satisfaction with various aspects of the work on loyalty.

Satisfaction with the job as a whole was analyzed by means of an ordered probit model (Table 6). Among workers' personal characteristics the level of education influences satisfaction negatively, with more educated workers being significantly less satisfied. Also tenure in the organization, in terms of number of years, negatively influences satisfaction. Tenure may influence satisfaction negatively because initial enthusiasm may decrease as time passes. On the other hand, workers' gender and age do not influence satisfaction. Working in direct contact with clients increases satisfaction, both in terms of presence or absence and in terms of intensity (number of hours spent with client).

The hourly wage is not significant: satisfaction with the job as a whole is uncorrelated with the level of monetary remuneration. This is partly explained by heterogeneous worker expectations. Only when expectations are fulfilled will monetary remuneration positively contribute to workers satisfaction.<sup>9</sup> Furthermore, some workers may be dissatisfied with their wage. However, the percentage of workers giving high importance to monetary remuneration seems to be limited since the social service sector has, on average, lower wage levels. Workers attracted mainly by monetary remuneration are likely to select against the sector.<sup>10</sup>

Among organizational characteristics, the presence of volunteers and good relations between organization and clients do not influence workers' satisfaction. Finally, the public nature of organizations reduces satisfaction significantly: private organizations seem able to offer better incentive mixes to workers.

Table 6 – Satisfaction with the job as a whole (ordered probit)

Variables <sup>a</sup>	Coef.	Z	P[ Z >z]	Sign. <sup>°</sup>
Age	.0043	1.51	.132	
Gender (male=0, female=1)	-.0478	-.85	.396	
Level of education (incremental variable from lower secondary school certificate to degree or MA)	-.1070	-5.47	.000	***
Hourly wage	.0093	.83	.405	
Activity in direct contact with clients (1=activity in direct contact with clients, 0= other activities)	.1569	2.53	.012	**
Time spent with clients	.1156	6.04	.000	***
Tenure in the organization (years)	-.0087	-2.44	.015	**
Presence of volunteers	.0223	.39	.699	
Quality of organization/clients relations <sup>d</sup>	.0238	.95	.341	
Nature of the organization (0=private organization , 1=public organization)	-.2604	-4.04	.000	***
Intrinsic attitudes <sup>d</sup>	.1766	10.36	.000	***
Other extrinsic attitudes <sup>d</sup>	-.0195	-.82	.413	
Economic attitudes (interest in the wage) <sup>d</sup>	-.0484	-2.43	.015	**
Relational attitudes <sup>d</sup>	.0548	3.8	.000	***

<sup>a</sup> Variables signed by <sup>d</sup> are discrete and range from 1 (min) to 7 (max). All other variables are continuous.

<sup>°</sup> Significance: \*\*\*=less than 1%, \*\*=less than 5%, \*=less than 10%.

The last group of variables reflects workers' attitudes toward work as spelled out in Table 4. Intrinsic and relational attitudes are those that best support higher satisfaction. Which means that workers driven by deeper motivations and by the desire to build positive social relations on the job are more likely to be satisfied with their work. The result is more striking when the negative linkage between economic attitudes and general satisfaction is added: workers driven by economic motivations are less satisfied with their work. It may be that jobs in the social service sector leave workers motivated by economic considerations particularly unsatisfied, so that the result cannot be generalized. However, the different impacts of different kinds of attitudes should be stressed. Finally, non-monetary extrinsic attitudes are non correlated with workers' satisfaction.

The second model (Table 7) concerns the elements influencing workers' loyalty to the organization. Two logit estimations were produced.

Table 7. Loyalty to the organization (logit estimation)\*

	The worker intends to...					
	Stay in the organization as long as possible			Stay in the organization at least for some years		
Variables <sup>a</sup>	Coeff.	P[ Z >z]	Sign. <sup>o</sup>	Coeff.	P[ Z >z]	Sign. <sup>o</sup>
Constant	-3.844	0.000	***	-3.302	0.000	***
Age	0.041	0.000	***	0.053	0.000	***
Gender (0=male, 1=female)	-0.091	0.432		-0.280	0.022	**
Level of education (incremental variable from lower secondary school certificate to university degree or MA)	-0.158	0.000	***	-0.100	0.015	**
Labor contract (0= other type of contract, 1= open-end contract)	0.469	0.000	***	0.521	0.000	***
Hourly wage	-0.002	0.930		-0.018	0.431	
Tenure in the organization (years)	0.013	0.095	*	0.000	0.987	
Presence of volunteers	0.057	0.632		0.174	0.164	
Quality of organization/clients relations <sup>d</sup>	0.101	0.062	**	0.067	0.225	
Public organization versus private (0=public organization, 1=private organization)	-0.419	0.002	***	-0.371	0.008	***
Intrinsic attitudes	0.024	0.473		-0.027	0.427	
Satisfaction with other extrinsic goods <sup>d</sup>	0.275	0.000	***	0.381	0.000	***
Economic satisfaction (interest in the wage) <sup>d</sup>	0.171	0.000	***	0.089	0.041	***
Relational satisfaction <sup>d</sup>	0.121	0.005	***	0.139	0.001	**

<sup>a</sup> Variables signed with <sup>d</sup> are discrete variables ranging from 1(min) to 7 (max). All other variables are continuous.

<sup>o</sup> Significance: \*\*\*= less than 1%, \*\*= less than 5%, \*= less than 10%..

Intention to stay as long as possible:

Observations 2066; Iterations completed 4; Log likelihood function -1260.128; LR Chi-squared 342.42; Degrees of freedom 13; Pseudo R<sup>2</sup>=0.1196; Significance level .0000

Intention to stay at least for some years:

Observations 2066; Iterations completed 5; Log likelihood function -1196.546;LR Chi-squared 354.63; Degrees of freedom 13;Pseudo R<sup>2</sup>=0.1291; Significance level .0000

In the first model the dependent variable corresponds to workers' desire to stay with the organization as long as possible. As far as personal characteristics are concerned, the intention to stay is positively related to workers' age, but negatively to the level of education: younger and educated workers tend to be less loyal, probably because younger workers have not yet found a stable occupation, while educated workers more often take other job opportunities into consideration. Workers on open-ended contract are more loyal than workers on fixed-term contracts. An interesting interplay between the stability of the job and loyalty is highlighted. Open-ended contracts are likely to decrease frictions between worker and organization. On the other hand, gender is not relevant to loyalty,<sup>11</sup> although men seem to prefer to stay with the organization at least for some years longer than women. Tenure in the organization is weakly linked with loyalty only for workers who intend to stay as long as possible.

As for organizational variables, the presence of volunteers (indexed by their number) does not have any influence on workers' loyalty, whereas the quality of relations between organization and clients is likely to increase it, but only for workers who intend to stay with the organization as long as possible. As in the case of worker satisfaction, there is no relationship between the level of the wage and workers' loyalty. Another important result is that workers in public organizations are less loyal than workers in private (for-profit and non-profit) organizations, even if the former usually have more stable jobs and higher wages.

Looking at satisfaction and motivations, there is a close relation between workers' loyalty on the one hand, and satisfaction with extrinsic, economic and relational goods on the other: the more workers' are satisfied, the more they are loyal to the organization. As shown in more detail by Borzaga and Depedri (2004) extrinsic (both economic and non-economic) and relational satisfaction are likely to correspond to two different kinds of incentives. Both kinds of remuneration positively affect workers' desire to stay with the organization.<sup>12</sup>

On the other hand, Borzaga and Depedri (2004) also show that intrinsic satisfaction does not significantly influence loyalty. One possible interpretation of this result is that intrinsic satisfaction is not to be considered a form of worker remuneration, hence its linkage with loyalty is weaker: workers satisfied with the intrinsic aspects of the job may prefer to quit if pay is too low or relations have deteriorated. The same logit estimation also shows that the link between loyalty and motivations is weaker. Intrinsic motivations do not significantly influence loyalty. Previous elaborations showed that neither do extrinsic, economic and relational motivations influence loyalty.<sup>13</sup> The upshot is that incentives, both in the form of economic incentives and relational goods, have a stronger influence on loyalty than motivations.<sup>14</sup>

To sum up, intrinsic and relational attitudes are likely to support higher satisfaction, while economic attitudes decrease job satisfaction. In its turn, satisfaction (intrinsic, economic, and relational) impacts heavily on workers' loyalty to the organization.

### 5.1. The role of extrinsic incentives

The extrinsic remuneration offered by the organizations to their workers consists not only of pay, which, as shown, is not correlated with worker satisfaction and loyalty to the organization, but also of other non-monetary yet economic aspects of work (Table 8). Workers' well-being therefore depends, on the extrinsic side, on the satisfaction that they derive directly from the wage, job security, the work environment, working hours and possibilities of career advancement. Analyzing these aspects yields a more detailed picture of how extrinsic incentives other than wage not only have direct repercussions on job satisfaction but are able to respond just as much as pay, or even more so, to workers' expectations and interests (i.e. initial motivations).

In regard to these other extrinsic aspects of work, public-sector employees are once again the least satisfied. In nonprofits, there is greatest satisfaction with professional development (which is particularly appreciated in social cooperatives) and with working hours schedules which enable workers (the majority of whom are female) to reconcile work with family commitments. The extrinsic aspect of greatest satisfaction to workers in for-profit enterprises is the work environment. As far as career advancement is concerned, levels of satisfaction are somewhat low in all types of organization, but once again the lowest ones are recorded in the public sector. Moreover, and quite unexpectedly, levels of satisfaction in nonprofit organizations are higher than in for-profit enterprises (especially in social cooperatives and religious nonprofits) as regards both career progress already achieved and future expectations, probably because nonprofits are dynamic and many workers expect to reach high levels in the hierarchical structure. The overall picture is a rather composite one, and it is hard to detect a general trend in worker satisfaction for extrinsic aspects of the job, apart from the fact that public organizations seem to be at a disadvantage in many respects.

Table 8. Satisfaction with extrinsic aspects of work by type of organization \*

<u>Satisfaction with ...</u>	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non- religious n-p</u>	<u>Religious non- profit</u>	<u>Total</u>
<u>The job as a whole</u>	5.00	5.34	5.39	5.31	5.53	5.27
Professional development	4.15	4.03	4.99	4.45	4.72	4.50
Work environment	4.07	4.77	4.53	4.54	5.06	4.48
Wage	4.02	4.19	3.78	4.17	4.64	4.07
Working hours	4.58	4.58	4.97	4.89	5.07	4.81
Career advancements achieved	2.47	3.05	3.54	3.23	3.37	3.10
Future career advancements	2.28	2.85	3.49	2.99	3.11	2.93
Job security	4.72	5.33	4.25	4.58	5.46	4.70

(\*)The interviewees chose a value on a scale from 1 (minimum) to 7 (maximum).

## 5.2. Intrinsic incentives

The importance of non-economic (i.e. social) incentives emerges clearly when the scores given for satisfaction with the intrinsic aspects of work (Table 9) are analyzed. In fact, the workers declared that they gained high levels of satisfaction from intrinsic aspects of their work. The items which received the highest scores in this respect were the social utility of the work and its variety and creativity. The other intrinsic aspects of the work also received scores invariably above the average.

As for differences among types of organization, most satisfied with intrinsic aspects were workers in social cooperatives, who gave higher scores to all these aspects of work, except for its social utility. The latter was particularly appreciated in the other nonprofit organizations, but also in for-profits, especially in respect to the other items of intrinsic satisfaction. Workers in social cooperatives are particularly attracted by the intrinsic aspects of their work and maintain that organizations offer them satisfactory mixes of incentives.<sup>15</sup> In public bodies, by contrast, even if intrinsic attitudes toward work are as strong as in the other organizational forms, workers are less satisfied. The



difference is most marked with respect to nonprofit organizations, while for-profit firms lie in between the two.

Table 9. Satisfaction with the intrinsic aspects of the work by type of organization \*

<u>Satisfaction with ...</u>	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non- religious n-p</u>	<u>Religious non- profit</u>	<u>Total</u>
<u>The job as a whole</u>	5.00	5.34	5.39	5.31	5.53	5.27
Decision-making autonomy	3.99	4.01	4.77	4.38	4.56	4.36
Recognition of one's contribution	4.17	4.29	4.90	4.56	4.79	4.54
Variety and creativity of the job	4.40	4.20	4.95	4.65	4.77	4.63
The social usefulness of the job	5.16	5.32	5.34	5.40	5.49	5.31

(\*)The interviewees chose a value on a scale from 1 (minimum) to 7 (maximum)..

### 5.3. Relational incentives

Satisfaction is not connected solely with the intrinsic and extrinsic aspects of the job; it is also correlated with opportunities to establish relations of trust, knowledge and collaboration with other persons (internal and external to the organization). This is an aspect of particular importance also because it has only recently been subjected to systematic analysis (Gui and Sugden, 2004; Borzaga and Depedri, 2004). Secondly, relational aspects engender a sense of group belonging, of involvement in the organization's mission, and of integration into the productive structure. Finally, relations are essential for the production of services like social ones where productivity and efficiency are evaluated mainly in qualitative, human and therefore relational terms.

Analysis of satisfaction with the relational items (Table 10) shows that workers in the social services sector are very satisfied with their relationships with colleagues, volunteers and also superiors. Besides the constantly high level of satisfaction among workers in religious nonprofits, to be noted is the presence of very positive relations in all the private organizations, where they are reported to be very good with superiors (although there is a slightly lower level of satisfaction in other non-religious nonprofits) and especially with colleagues. In public organizations, instead, bureaucracy and

hierarchy seemingly cause the worst relations, and the most frictions, especially with superiors.

Table 10. Satisfaction with the relational aspects of the work by type of organization \*

<u>Satisfaction with ...</u>	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non- religious n-p</u>	<u>Religious non- profit</u>	<u>Total</u>
<u>The job as a whole</u>	5.00	5.34	5.39	5.31	5.53	5.27
Relations with superiors	4.72	5.34	5.40	5.18	5.61	5.17
Relations with colleagues	5.22	5.65	5.69	5.59	5.56	5.51
Relations with volunteers	5.17	4.91	5.45	5.66	5.79	5.47

(\*)The interviewees chose a value on a scale from 1 (minimum) to 7 (maximum).

#### 5.4. A synthesis

The sorting of the various typologies of incentives described so far and their relevance are confirmed by principal components analysis,<sup>16</sup> which yielded the coefficients shown in Table 11. Three components are significant<sup>17</sup> and they evidence the existence of distinct second level or hidden dimensions in the analysis of the items of satisfaction. The first components group together extrinsic and relational goods, the second component includes the items concerning intrinsic incentives,<sup>18</sup> while the third component refers to purely economic incentives.<sup>19</sup>

Table 11. Grouping the items of satisfaction (principal components analysis)<sup>a</sup>

	<u>Component</u>		
	1	2	3
	<u>relational and extrinsic incentives</u>	<u>intrinsic incentives</u>	<u>economic incentives</u>
<u>Professional development</u>		.664	
<u>Decision-making autonomy</u>		.712	
<u>recognition of one's contribution</u>		.688	
<u>variety and creativity of the job</u>		.713	
<u>working environment</u>	.568		
<u>the social usefulness of the job</u>		.486	
<u>the salary</u>	.485		.494
<u>working hours</u>	.636		
<u>previous career advancements</u>			.842
<u>future career advancements</u>			.833
<u>job security</u>	.694		
<u>relations with superiors</u>	.639		
<u>relations with colleagues</u>	.647		

Rotation Method: Varimax with Kaiser Normalization.

a Rotation converged in 5 iterations.

Relational and extrinsic (both economic and non-economic) incentives belong to the first component, and therefore define the first dimension. To be noted is that the analysis is unable to sort relational and extrinsic (mostly non-economic) incentives into different groups, despite their different economic natures (monetary vs non-monetary). Their grouping within the same component shows that they can be compared, and that workers may be induced to choose the organization on the basis of the mix of relational

and extrinsic goods offered. Table 6 showed that satisfaction with extrinsic and relational goods is most likely to influence workers' loyalty. The two results taken together confirm that on-the-job consumption of these goods is taken by workers as constituting a unique incentive mix, which proves to be the most important.<sup>20</sup> In other words, a trade-off between relational and extrinsic incentives can be hypothesized (Borzaga and Depedri, 2004). Different organizational forms may be characterized by different provisions of the two kinds of incentives, pointing up different capabilities and costs in providing them. Each kind of organization will provide the least costly incentive mix resulting in multiple and potentially efficient organizational equilibria. Intrinsic incentives, which are comprised in the second dimension, compactly define a unique class of incentives for workers, though it must be borne in mind that they did not influence significantly workers' loyalty. Purely economic incentives (pay and career advancement) are found in the third component and appear to be relatively less important in characterizing workers' well-being.<sup>21</sup>

## 6. Fairness

Thus far, the paper has concentrated on the main features of incentives mixes in the various organizational forms. However, the mere difference in incentive mixes highlighted thus far is not marked enough to account for the differences in the overall levels of worker satisfaction observed across organizational forms. Significant differences in workers' satisfaction were observed for intrinsic and relational goods, which favored NPOs and disfavored public organizations and, to a lesser extent, for-profit firms. The latter were characterized by a higher supply of extrinsic goods. Indeed, it is possible to hypothesize that worker satisfaction is not influenced solely by the composition of the incentives mix, but also, and in some cases especially, by the perception that the distribution of incentives among workers, proportionally to their responsibility and commitment, is fair. Authors have talked in this regard of perceived fairness (Thibaut and Walzer, 1975; Lynd and Tyler, 1988; Benz, Frey and Stutzer, 2002; Frey and Stutzer, 2004). Distributive justice can be defined as the relation between inputs and outputs in comparison to the same relation for a certain reference group. If outcomes are distributed fairly the ratio of outputs to inputs would tend to equalize across individuals (Adams, 1963, 1965; Solari, 2003). On the other hand, procedural justice is usually referred to as a property of relations which guarantee fair outcomes, but it can also be referred to the quality of procedures, for example as long as the circulation of information is concerned, disregarding outcomes (Tyler and Blader, 2000; Solari, 2003). Our data enabled us to examine both types of fairness: two indexes of distributive and procedural fairness were calculated and added to the other independent variables influencing workers' satisfaction and loyalty.

Descriptive analysis of distributive and procedural fairness by type of organization (Table 12) shows that, in general, differences among the values for distributive fairness

are not as marked as those for procedural fairness. Indeed, public organizations show a significant disadvantage also as far as the perception of distributive fairness is concerned. Workers in public organizations are less satisfied with all the items of distributive fairness, their higher income notwithstanding, while workers' satisfaction in for-profit firms lies in between public and nonprofit organizations. A pronounced difference is found as regards the perception of financial constraints undergone by the organization: workers in social cooperatives seem to be much more aware of financial constraints than are those in other organizational forms.

The most marked differences among types of organization is apparent in the perception of procedural fairness. In particular, workers in social cooperatives give higher scores to the items of procedural fairness<sup>22</sup> than do those in all the other organizations. This perception of greater fairness is influenced by the transparency of the organizational model due also to worker involvement in the management of the organization. The main differences are those between social cooperatives and public organizations. It is the workers in the latter, in fact, that give the lowest scores to almost all the items for procedural fairness, expressing themselves as especially dissatisfied with the balance between remuneration and contribution to the organization and as not satisfied with forms of communication, career profiles and opportunities for professional growth. Low procedural fairness, and therefore the inadequacy of incentive structures may crowd out intrinsic work incentives and induce workers to demand and managers to concede, increasing extrinsic incentives (Frey, 1997). However, higher wages are not sufficient to induce a perception of greater distributive justice.

Table 12 - Fairness in relations with the organization by the nature of the same (average scores)\*

	<u>Public ownership</u>	<u>For-profit</u>	<u>Social cooperatives</u>	<u>Other non- religious n-p</u>	<u>Religious non- profit</u>	<u>Total</u>
<u>Distributive fairness</u>						
Responsibility	3.6	3.9	4.0	4.2	4.6	4.0
Training	3.6	3.8	4.1	4.2	4.4	4.0
Experience	3.6	4.0	4.1	4.1	4.3	4.0
Effort	3.4	3.7	4.0	4.0	4.3	3.8
Quality of the work	3.5	3.8	4.0	4.0	4.5	3.9
Stress and tension	3.0	3.3	3.6	3.6	3.8	3.4
Economic resources of the Organization	3.5	3.7	5.0	4.4	4.5	4.2
<u>Average score</u>	3.46	3.74	4.11	4.07	4.30	3.90
<u>Procedural fairness</u>						
Incentives/contribution balance	2.5	3.3	3.5	3.0	3.3	3.1
Communication	3.9	5.0	5.0	4.2	4.8	4.5
Career	2.2	3.0	4.0	3.2	3.2	3.1
Being listened to	3.3	4.2	4.7	4.1	4.4	4.1
Growth	3.3	3.9	4.7	4.2	4.5	4.1
Transparency of promotions	2.1	3.0	3.6	3.0	3.2	3.0
<u>Average score</u>	2.88	3.73	4.25	3.62	3.90	3.65

(\*)The interviewees chose a value on a scale from 1 (minimum) to 7 (maximum).

In order to evaluate the role and weight of procedural and distributive perceived fairness for workers' satisfaction and desire to stay with the organization, we again produced the estimates presented in Tables 5 and 6, adding the two indexes<sup>23</sup> representing fairness. Our comments will be restricted to the main differences with respect to the previous estimates, which are reported together with the new estimates in Tables 13 and 14.

When workers' satisfaction with job as a whole is considered, it is immediately evident that the link between the indexes representing justice and satisfaction is indeed strong. Procedural and distributive fairness record the highest values for the Z statistics, and procedural fairness emerges as the main determinant of worker satisfaction. Workers pay close attention to the way in which their working position is managed by their superiors, and to the rules followed in deciding on task assignment and career advancement. Workers declare themselves most satisfied when the organizational and decision-making model adopted by the organization is transparent and impartial. Distributive fairness, too, is closely correlated with workers' satisfaction. And fairness in deciding on wages and the intensity of effort is also important from the workers' point of view. The participatory character of many firms working in the social services sector, like social cooperatives, needs to be taken into account. It is possible that workers in this sector are particularly sensitive to issues concerning justice, and the emerging relation is strong indeed.

Table 13 – Satisfaction with the job as a whole (ordered probit)

Variables <sup>a</sup>	<u>Considering perceived fairness</u>				<u>Without considering perceived fairness</u>	
	Coeff.	Z	P[ Z >z]	Sign. <sup>o</sup>	Z	Sign.
Age	0.003	0.980	0.328		0.0043	
Gender (male=0, female=1)	0.047	0.820	0.412		-0.0478	
Level of education (incremental variable from lower secondary school certificate to degree or MA)	-0.081	-4.060	0.000	***	-0.1070	***
Hourly wage	-0.003	-0.270	0.784		0.0093	
Tenure in the organization (years)	-0.002	-0.650	0.517		-0.0087	**
Presence of volunteers	-0.049	-0.850	0.398		0.0223	
Activity in direct contact with clients	0.024	0.380	0.707		0.1569	**
Time spent with clients	0.111	5.700	0.000	***	0.1156	***
Quality of organization/clients relations <sup>d</sup>	0.002	0.070	0.948		0.0238	
Nature of the organization (0=private organization, 1=public organization)	-0.007	-0.110	0.913		-0.2604	***
Intrinsic attitudes <sup>d</sup>	0.126	7.220	0.000	***	0.1766	***
Other extrinsic attitudes <sup>d</sup>	-0.065	-2.670	0.008	***	-0.0195	
Economic attitudes (interest in the wage) <sup>d</sup>	-0.048	-2.380	0.017	**	-0.0484	**
Relational attitudes <sup>d</sup>	0.056	3.850	0.000	***	0.0548	***
Procedural fairness	0.286	12.820	0.000	***		
Distributive fairness	0.151	8.450	0.000	***		

<sup>a</sup> Variables signed by <sup>d</sup> are discrete and range from 1 (min) to 7 (max). All other variables are continuous.

<sup>o</sup> Significance: \*\*\*=less than 1%, \*\*=less than 5%, \*=less than 10%.

Maximum likelihood estimates: Observations 1946; Iterations completed 3; Log likelihood function -3226.538; LR Chi-squared 664.33; Degrees of freedom 16; Pseudo R<sup>2</sup>=0.0933 Significance level .0000

The differences with previous estimates evidence a decrease in the significance of the activity in direct contact with clients and of tenure. Also the nature (public vs private)



becomes insignificant. The latter result is likely to have important implications for relations between the nature of organizations and the procedural and distributive fairness of processes taking place within them. Indeed, it seems that fairness is a good proxy for the nature of the organization, which is replaced as the main element influencing worker satisfaction. As shown by Table 12, the public sector records the lowest levels of procedural and distributive fairness. Hence its negative role in influencing workers' satisfaction is partially summarized by the indexes of fairness.<sup>24</sup> Also to be noted is that the value of the Z statistic for intrinsic attitudes reduces significantly after the two indexes of fairness are introduced, although the variables remain significant. This may mean that strongly motivated workers tend to perceive a more equitable environment.<sup>25</sup>

Similar results are obtained as regards the impact of justice on workers' loyalty to the organization. Only those concerning workers' desire to stay with the organization as long as possible are discussed here.<sup>26</sup> The indexes of justice, both procedural and distributive, are again significant at the 1 percent level, though the values of the Z statistic highlight that the result was comparatively lower than in the case of satisfaction. Fairness is again one of the main factors influencing the strength of the relation between worker and organization. This time the role played by distributive fairness seems to be slightly stronger than procedural fairness: whilst procedural fairness is more important in increasing workers' satisfaction, distributive fairness seems to impact more heavily on their desire to stay. In some cases, workers dissatisfied with procedures may prefer to stay when the distribution of resources is equitable.<sup>27</sup>

Procedural and distributive fairness do not seem to substitute for satisfaction in the definition of workers' desire to stay. Only in the case of relational satisfaction does the significance decrease from the 1 percent level to the 10 percent level. Relational satisfaction can to a certain extent be equated with procedural fairness since good relations usually accompany fair procedures, and this idea could support the result. No other important changes are to be highlighted, except for a slight decrease in the significance of the quality of relations between organization and clients, and a slight increase in the significance of tenure, which is now positively linked with workers' desire to stay.<sup>28</sup> Overall, both estimates concerning overall job satisfaction and loyalty to the organization support the hypothesis put forth in Section 2: justice does not seem to substitute incentives mixes, but it is likely to pertain to workers' assessment of the processes taking place within the organization, more than to actual decisions (outcomes) implemented in order to motivate them.

Table 14 - Loyalty to the organization (logit estimation)\*

	The worker intends to stay in the organization as long as possible					
	Considering perceived fairness				Without considering perceived fairness	
Variables <sup>a</sup>	Coeff.	Z	P[ Z >z]	Sign. <sup>2</sup>	Coeff.	Sign. <sup>2</sup>
Constant	-4.465	-6.950	0.000	***	-3.844	***
Age	0.041	6.560	0.000	***	0.041	***
Gender (0=male, 1=female)	-0.030	-0.250	0.801		-0.091	
Level of education (incremental variable from lower secondary school certificate to university degree or MA)	-0.140	-3.490	0.000	***	-0.158	***
Labor contract (0= other type of contract, 1= open-end contract)	0.535	4.530	0.000	***	0.469	***
Hourly wage	-0.008	-0.340	0.733		-0.002	
Tenure in the organization (years)	0.016	2.040	0.041	**	0.013	*
Presence of volunteers	0.006	0.050	0.960		0.057	
Quality of organization/clients relations <sup>d</sup>	0.091	1.670	0.095	*	0.101	**
Public organization versus private (0=public organization, 1=private organization)	-0.319	-2.280	0.023	**	-0.419	***
Intrinsic attitudes	0.015	0.430	0.667		0.024	
Satisfaction with other extrinsic goods <sup>d</sup>	0.151	2.750	0.006	***	0.275	***
Economic satisfaction (interest in the wage) <sup>d</sup>	0.116	2.760	0.006	***	0.121	***
Relational satisfaction <sup>d</sup>	0.081	1.820	0.070	*	0.171	***
Procedural fairness	0.146	2.850	0.004	***		
Distributive fairness	0.171	4.340	0.000	***		

<sup>a</sup> Variables signed with <sup>d</sup> are discrete variables ranging from 1(min) to 7 (max). All other variables are continuous.

° Significance: \*\*\*= less than 1%, \*\*= less than 5%, \*= less than 10%..

Observations 2066; Iterations completed 5; Log likelihood function -1242.343; LR Chi-squared 377.99; Degrees of freedom 15; Pseudo R<sup>2</sup>=0.132; Significance level .0000

In the case of both worker satisfaction and loyalty to the organization, introducing the indexes of justice improves the fit of the model. The value of the log-likelihood function increases, and so does the value of the chi-squared statistic and the value of the pseudo- $R^2$ . The increase in significance in the case of worker satisfaction is particularly large, indicating that fairness has a stronger explanatory capacity for satisfaction than for loyalty.

To sum up this section, the perception of justice within the organization is the most crucial element in defining workers' satisfaction and the strength of their relation with the organization. Intrinsic, relational, and economic attitudes should be added to justice as important elements influencing workers' general level of satisfaction. As for workers' loyalty, satisfaction (extrinsic, economic, and relational) more than attitudes appears to be crucial, together with fairness, which emerges as an independent criterion used by workers to evaluate fair processes within the organization.

## 7. Concluding remarks

Empirical analysis of data collected on the Italian social services confirms that organizational forms differ in the incentive mixes supplied to workers, especially as far as intrinsic and relational incentives are concerned. Yet worker perceptions of the fairness of incentives mixes are likely to be of even greater weight.

The incentive mixes put in place by different organizational forms differ in important ways. Some organizations seem to be weaker in all respects in the manner in which they are able to reconcile incentives (first and foremost monetary ones) and worker satisfaction, while others have strengths and weaknesses. More specifically, public organizations seem to give more weight to economic incentives, but score lowest in almost all respects when workers satisfaction is taken into account, also as regards extrinsic and monetary incentives. For-profit firms rely mainly on extrinsic incentives, which are likely to be the main means by which they motivate workers. Nonprofit organizations seem to base their incentive mixes relatively more on relational and intrinsic motives. Social cooperatives distinguish themselves as the organizational form which places the greatest weight on participation and intrinsic motivation. NPOs are able to obtain the highest degree of worker satisfaction on most of the items considered, their disadvantage in the field of monetary remuneration notwithstanding.

The account of the variables that influence workers' satisfaction and loyalty to the organization is greatly improved when perceived fairness, mainly at the procedural but also at the distributive level, is added. Workers care greatly about the fairness of processes within the organization. This is the case at the distributive level, where workers, given their economic expectations, rate the fairness of their remuneration level

in relation to their experience, skills, and delivered effort but also in comparison with the income of their reference group (usually fellow workers). The simple level of their salary seems not to play a significant role. However, this is all the more true in relation to procedures followed by the management in assigning tasks and evaluating their results, communicating evaluations and defining career prospects. Procedural fairness emerges as a key element in explaining workers' satisfaction. Social cooperatives, compared to public organizations and for-profit firms, but also to the other nonprofit organizations, seem to be the organizational forms best able to convince workers of the fairness of implemented decisions, thus compensating for the disadvantage at the level of monetary remuneration. Worker participation and fairer decisions, intrinsic motivations and overall job satisfaction seem to find a better equilibrium in this kind of organization.

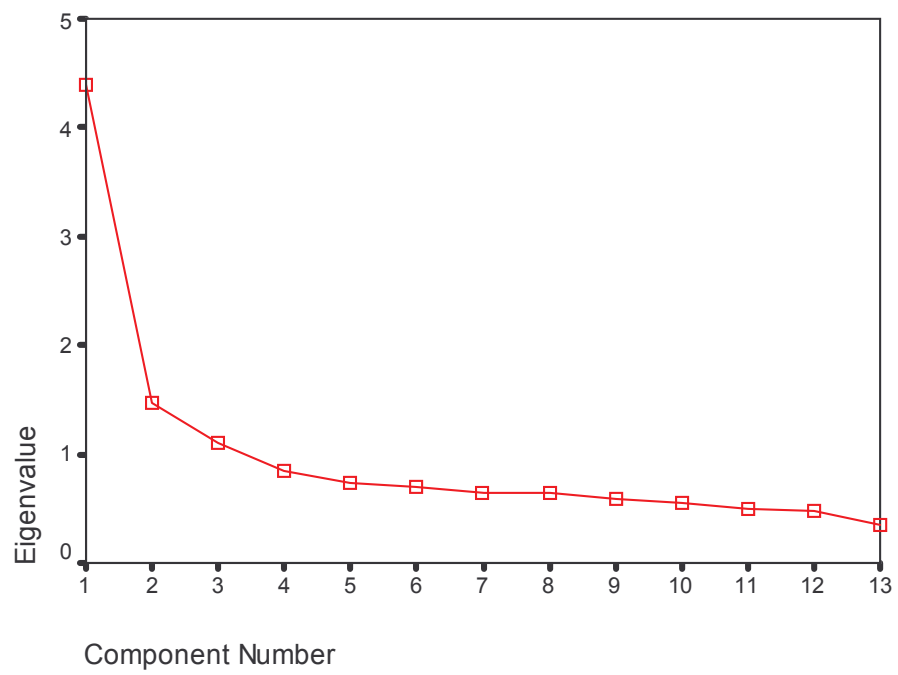
#### Appendix A. Principal components analysis on the items of worker satisfaction

##### Total Variance Explained

Component	Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	of Variance%	Cumulative %
1	4.392	33.783	33.783	2.557	19.666	19.666
2	1.476	11.355	45.138	2.514	19.337	39.003
3	1.096	8.429	53.567	1.893	14.564	53.567

Extraction Method: Principal Component Analysis.

Scree Plot



Component Matrix(a)

	Component		
	1	2	3
<u>Professional development</u>	.629		
<u>decision-making autonomy</u>	.642		-.364
<u>Recognition of one's contribution</u>	.669		-.330
<u>variety and creativity of the job</u>	.601		-.406
<u>working environment</u>	.621		
<u>the social usefulness of the job</u>	.526		
<u>the salary</u>	.548		.423
<u>working hours</u>	.586		
<u>previous career advancements</u>	.541	-.615	.303
<u>future career advancements</u>	.525	-.615	
<u>job security</u>	.444	.451	
<u>relations with superiors</u>	.633	.320	
<u>relations with colleagues</u>	.551	.405	

Extraction Method: Principal Component Analysis  
a. 3 components extracted.

Rotated Component Matrix(a)

	Component		
	1	2	3
<u>Professional development</u>		.664	
<u>decision-making autonomy</u>		.712	
<u>recognition of one's contribution</u>		.688	
<u>variety and creativity of the job</u>		.713	
<u>working environment</u>	.568		
<u>the social usefulness of the job</u>		.486	
<u>the salary</u>	.485		.494
<u>working hours</u>	.636		
<u>previous career advancements</u>			.842
<u>future career advancements</u>			.833
<u>job security</u>	.694		
<u>relations with superiors</u>	.639		
<u>relations with colleagues</u>	.647		

Extraction Method: Principal Component Analysis.  
Rotation Method: Varimax with Kaiser Normalization.  
a. Rotation converged in 6 iterations.

## End Notes

1. These are enterprises in which ownership and therefore governance rights are assigned to the workers or to a mix of workers and volunteers. Besides these types, social cooperatives also comprise other ownership mixes – for example, consumers and workers, consumers and voluntary workers – but at the moment these are in the minority and will therefore not be considered here.
2. The importance of information asymmetries in the supply of social services as the basis for the development of non-profit organizations has been emphasized by Hansmann (1996), as well as by various other authors, including Turati (2001). The public nature of the services furnished by non-profit organizations was initially stressed by Weisbrod (1975, 1977). In this perspective we should single out theories à la Weisbrod based on the public nature of goods produced by non-profit organizations and introduce them as a third possible explanation. However, we prefer to keep the analysis as simple as possible by referring exclusively to the “asymmetric information paradigm” originated by Hansmann. The reason is that the production of public goods supplied by NPOs very often present important problems linked to asymmetric information; hence, for our purposes, the two explanations can be conflated together.
3. A possible explanation for the low pay levels in social enterprises is that, although at the moment wages are relatively low, the social services sector is still too segmented, with significant barriers against the integration of supply and therefore against the economies of scale and scope that could derive from it.
4. Among authors more skeptical as to whether non-profit organizations represent valid alternatives to public organizations and for-profit enterprises in the production of social services are Glaeser and Shleifer (2001), Ortmann and Schleisinger (2003) and Hansmann himself (2003).
5. The dataset was produced by ISSAN, Institute for the Development of Nonprofit Organizations, University of Trento, in collaboration with FIVOL, Italian Foundation for Voluntary Work, and FEO, European Foundation for Employment. It was based on four questionnaires (for enterprises, managers, paid workers and voluntary workers) distributed to 228 organizations (268 production units) and 2066 workers.
6. The table shows three average values. Further analysis highlights different pay structures, for example by tenure. For longer tenured workers the gap between private and public sectors tends to diminish. Recalling the fact that many non profit organizations came into being in the 1990s, an important part of the public/private wage differential can be explained on the basis of shorter workers’ tenure.
7. Only in for-profit enterprises was this aspect slightly less important than job security.
8. Close involvement is not just theoretical, for social cooperatives are in practice the organizations that most closely involve their workers, mainly in the social base and in management bodies.
9. This is confirmed by the positive and significant correlation between the general level of satisfaction with the job and satisfaction with the wage.
10. Only 13 percent of workers gave scores higher than four (on a Lickert scale from one to seven) when asked if they had chosen the organization because of higher remuneration.
11. This contrasts with the findings of Mirvis and Hackett (1983), who for the US found higher female than male satisfaction in the 1970s. Their main conclusion is that women’s satisfaction is boosted by weaker working position and lower expectations about professional role and pay.
12. Scrutiny of likelihood ratios by means of STATA logistic confirms the results. The variables that present the highest likelihood ratios (higher than 1.1) are primarily the items of satisfaction (extrinsic, economic, and relational). Also the quality of relations with clients shows a high ratio, while the highest ratio (1.66) is found for workers on open-ended contract, and the lowest for the public nature of the organization (0.68), which is the variable most likely to decrease workers’ loyalty.
13. The second logit estimation in table 6 in this paper refers to the desire to stay with the organization for at least some years. The results are very similar to those from the previous estimation, apart from the fact that in the shorter the quality of relations between organization and clients do not influence loyalty, while women are more loyal.



14. Two logit estimates were performed in Borzaga and Depedri (2004). In the first, only motivations were introduced, while in the second motivations were substituted by the items of satisfaction. Among motivations, only intrinsic ones emerged as significantly linked with loyalty. Extrinsic, economic and relational motivations were not significant. When consideration was made of the satisfaction items, extrinsic and relational satisfaction emerged as the most relevant. In table 6 we consider only the items that were most significant in previous elaboration. The biggest difference in results is that, this time, intrinsic motivation become insignificant. Given the strong link between intrinsic motivations and relational satisfaction, evidenced both by means of simple correlation coefficients and by means of probit estimation (Borzaga and Depedri, 2004), a possible explanation for the result is that workers with the strongest intrinsic motivations tend to develop better relations on the job. However, the final result of the process (better relations) is more important in influencing loyalty than intrinsic motivations.
15. Moreover, even compared to the other types of nonprofits, social cooperatives are characterized by closer involvement in the organization, by mutuality and the principles connected with it. Though beyond the scope of this paper, the interconnections between participation, intrinsic motivations, and intrinsic satisfaction should be analyzed in more depth.
16. Categorical principal components analysis (CatPCA) was first performed. Categorical data transformed into numerical data by means of alternating least squares (ALS) were then used to perform principal components analysis.
17. All the components having eigenvalues higher than one were considered.
18. The second component was named “intrinsic incentives” even if it included professional development, which was not included among the items of intrinsic satisfaction. The label depends on the clear prevalence of the items of intrinsic satisfaction within the component. Besides, professional development may contribute at least partly to intrinsic satisfaction.
19. Reliability test were carried out by means of Cronbach’s alpha calculated on the various components emerging as significant. To this end coefficients higher than 0.3 were selected. Cronbach’s alpha was equal respectively to 0.72, 0.76, and 0.68. In the case of the third component, if the salary (the least significant variable) was dropped, alpha increased to 0.78. These values do not respect the highest standards of reliability for singling out second level or hidden dimensions, which are usually fixed at 0.8. However, all three components showed a good degree of reliability.
20. In Table 7 career advancements were included among extrinsic items of satisfaction, while in factor analysis they appear in the third, independent factor. Hence workers satisfaction concerning career advancement shows a relevant heterogeneity with respect to the other extrinsic aspects of the job.
21. See appendix A for further details and the numerical output of the analysis.
22. Note that by ‘procedural fairness’ is meant the perception of justice, good-quality internal communications and transparency in career advancements and the treatment of workers.
23. The indexes are the average scores calculated on the various items representing procedural and distributive justice, as represented in table 13.
24. The correlations coefficients between the indexes of procedural and distributive justice and workers’ satisfaction were both equal to about 0.4. I
25. In order to assess the relative goodness of fit of the two models concerning satisfaction, the Bayesian Information Criteria (BIC) can be used (Long, 1997, pp. 109-113). The difference in the BICs from the two models indicates which model is more likely to have generated the observed data. Using the version of the BIC that is equal to  $D(M) - df * \ln N$ , where  $D$  is the scaled deviance of the model  $M$  and it is equal to  $-2 \ln L(M)$ , where  $L(M)$  is the log likelihood function of the model.  $df$  are the degrees of freedom of the saturated model, equal to the sample size minus the number of parameters on the model  $M$ .  $N$  is the number of observations. The difference between the BICs for the two models in question was equal to 349.28 and indicated that the second model is more likely to have generated the observed data than the first. It should be stressed that the difference is particularly marked and indicates an important increase in the fit of the model when the indexes of justice are added.
26. The results on the desire to stay with the organization for at least some years do not exhibit fundamental differences.

27. The analysis of likelihood ratios by means of STATA logistic confirms what was found in the first estimation. The two indexes of justice show likelihood ratio higher than 1.1, but lower than 1.2. The highest ratio is again the one shown by workers on open-end contracts (1.77), while to lowest is to be attributed to the public nature of the organization (0.68).
28. Calculating the difference in the Bayesian Information Criteria (BICs) for the two models concerning workers' willingness to stay as long as possible, a value of 16.93 is found. It indicates that the second model is more likely to have generated the observed data than the first one.

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